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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/914,351	08/27/2001	Atsuro Tanuma	K-1992	3672
7590 04/21/2004				
Kanesaka And Takeuchi				
1423 Powhatan Street				
Alexandria, VA 22314				
		EXAMINER		
		MERLINO, AMANDA H		
		ART UNIT		
		PAPER NUMBER		
		2877		

DATE MAILED: 04/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No. 09/914,351	Applicant(s) TANUMA ET AL.	
	Examiner Amanda H Merlino	Art Unit 2877	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 12 January 2004.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) 7-9 and 13 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-6, 10-12 and 14-15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |   |   |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

### ***Election/Restrictions***

Claims 7-9 and 13 withdrawn from further consideration pursuant to 37 CFR 1.142(b) as being drawn to a nonelected invention, there being no allowable generic or linking claim. Election was made **without** traverse in papers filed on 1/12/2004.

### ***Drawings***

Figures 20-24 should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

### ***Claim Objections***

Claims 3 and 4 objected to because of the following informalities:

- a) on line 7 of claim 3 "form" appears to be misspelled. It should read "from". ;
- b) claim 4 has two sentences, claims are only permitted with one sentence.

Appropriate correction is required.

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

Claims 1-3, 10-11 and 14-15 rejected under 35 U.S.C. 102(a) as being clearly anticipated by Kagaku et al (JP 10300420 A).

Kagaku et al teach of a displacement measuring method and apparatus comprising a projecting means (1) that scans radiated light on the surface of the measuring object (5) for form an irradiation point, a light receiving means (7) that receives measuring beam from the irradiation point and a lens array (4) which is composed o f plural condenser lenses arranged in parallel having a uniform image formation characteristic around the optical axis, an imaging lens (10) converges the measuring beam to form the image formation point on the light receiving means (7) and a displacement operation means that operate an outputs a displacement signal of the surface of the m measuring object (20, 21).

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 4-6 rejected under 35 U.S.C. 103(a) as being unpatentable over by Kagaku et al (JP 10300420 A).

Kagaku et al teach of a displacement measuring method and apparatus comprising a projecting means (1) that scans radiated light on the surface of the measuring object (5) for form an irradiation point, a light receiving means (7) that receives measuring beam from the irradiation point and a lens array (4) which is composed o f plural condenser lenses arranged in parallel having a uniform image formation characteristic around the optical axis, an imaging lens (10) converges the

measuring beam to form the image formation point on the light receiving means (7) and a displacement operation means that operate an outputs a displacement signal of the surface of the m measuring object (20, 21).

Kagaku et al lacks the teaching of the relationship of the leans array, the imaging lens and the light receiving means being expressed by the equation  $0 < (f_2/f_1) \bullet t < w$  wherein w means the light receiving width parallel with the direction of a scan of the light receiving plant, t means the width parallel with the direction of a scan of each condenser lens, f1 means the for focal length of the condenser lens and f2 means the focal length of the imaging lens.

At the time of the invention, it would have been obvious to one having ordinary skill in the art at the time the invention was made to place the lens array and imaging lens at the position described in the above equation since it has been held that discovering an optimum value of a result effective variable involves only routine skill in the art. In re Boesch, 617 F.2d 272, 205 USPQ 215 (CCPA 1980

With regard to claim 5, Official Notice is taken that the use of a plurality of light receiving elements are old and well known in the art. See In ReMalcol 1942C.D.589:543 O.G.440.

### **Conclusion**

*Papers related to the application may be submitted to Group 2800 by Fax transmission. Papers should be faxed to Group 2800 via the PTO Fax Machine located in Crystal Plaza 4. The form of such papers must conform with the notice published in the Official Gazette, 1096 OG 30 (November 15, 1989). The CP4 Fax Machine number is:*

**703-872-9306**

Art Unit: 2877

If the applicant wishes to send a Fax dealing with a Proposed Amendment for discussion for a phone interview then the fax should:

1) Contain either the statement "DRAFT" or "PROPOSED AMENDMENT" on the Fax Cover Sheet; and

2) Should be unsigned by the attorney or agent.

This will ensure that it will not be entered into the case and will be forwarded to the examiner as quickly as possible.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to *Examiner Amanda H. Merlino* whose telephone number is (571)272-2421. The examiner can be reached on Mondays and Thursdays only.


Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 305-0956.

**Amanda H. Merlino** 

**Patent Examiner**

**Art Unit 2877**

April 15, 2004/ahm



**FRANK G. FONT  
SUPERVISORY PATENT  
EXAMINER**